

BEAM Plus Assessment

Summary of Decisions of Final Appeal Panels

(Version 4.0, data up to 20 August 2019; Case 41 has been added)

- (1) Issue No. : FA-001-01
Appeal Rec'd : May 2013
Credit No. : MA1 under BEAM Plus NB v1.1 (Provisional Assessment)
Description : The project was a redevelopment of a commercial building situated on an existing podium with a public transport interchange underneath. Since the podium would not be demolished, the Applicant deemed that more than 90% of the existing substructure was reused. The Applicant applied for 2 credits and 1 BONUS credit under MA1.
- Decision : The Final Appeal Panel opined that by definition, substructure generally comprised piles, pile caps and structures that were below ground level. The development was situated on a podium, which should be categorised as superstructure. Besides, the substructure was not within the scope of the development. In applying for the credits, the Applicant should submit calculation to justify the percentage of “superstructure” reuse. However, the superstructure of the old building was actually demolished. As such, the Final Appeal Panel considered that zero credit could be granted under MA1.
- (2) Issue No. : FA-001-02
Appeal Rec'd : May 2013
Credit No. : EU1 and EU2 under BEAM Plus NB v1.1 (Provisional Assessment)
Description : The project was a new commercial building. The BEAM Assessor opined that the figures of energy consumption did not tie in with the submitted energy analysis report and were not supported by calculations. Thus, no credit was granted under EU1 and EU2. The First Appeal Panel found that there was insufficient building information, lighting strategy, ventilation strategy and central plant information, etc. The Applicant opined that the requested information was not specific information according to BEAM Plus Guidebook. The Applicant submitted additional information during the Appeal process.
- Decision : The Final Appeal Panel opined that there was inconsistency in the original submission and the second submission submitted to the First Appeal Panel. The submission lacked details as to how the credit requirement was met. The Final Appeal Panel did not accept that the First Appeal Panel had erred in its finding.
- (3) Issue No. : FA-001-03
Appeal Rec'd : May 2013
Credit No. : EU6 under BEAM Plus NB v1.1 (Provisional Assessment)
Description : The project was a new commercial building. The BEAM Assessor opined that the submitted information did not provide satisfactory evidence to support the claimed amount of energy consumption obtained from renewable sources. The figures of energy consumption did not tie in with the submitted energy analysis report and were not supported by

calculations. Thus, no credit was granted under EU6. The First Appeal Panel found that the energy calculations in the first submission and the re-submission did not tally, and therefore decided to uphold the original decision.

Decision : The Final Appeal Panel opined that there was inconsistency in the original submission and the second submission submitted to the First Appeal Panel. The submission lacked details as to how the credit requirement was met. The Final Appeal Panel did not accept that the First Appeal Panel had erred in its finding.

(4) Issue No. : FA-001-04
Appeal Rec'd : May 2013
Credit No. : EU10e under BEAM Plus NB v1.1 (Provisional Assessment)
Description : The project was a new commercial building. The BONUS credit for Independent Commissioning Authority was not granted as the commissioning authority would be engaged by the Contractor.

Decision : The Final Appeal Panel noted that in the original submission, the contract specification required the Contractor to provide the commissioning authority. In the submission to the First Appeal Panel, the Applicant added evidence indicating that representatives from the Property Management Department and the future tenant would attend the T&C. The Applicant further added in the submission to the Final Appeal Panel that a truly independent commissioning authority would be provided. Since no new information should be considered during the appeal process, the Final Appeal Panel resolved that the credit should not be granted.

(5) Issue No. : FA-001-05
Appeal Rec'd : May 2013
Credit No. : WU2 under BEAM Plus NB v1.1 (Provisional Assessment)
Description : The project was a new commercial building. The credit for water leakage monitoring and control was not granted as there was no evidence to show effective monitoring of water pipe ducts/risers.

Decision : The Final Appeal Panel noted that the original submission lacked details as to how the credit requirement was met because pipe duct detectors were not present in the drawing. During the First Appeal, the Applicant volunteered to add leakage detectors to the pipe ducts. Since no new information should be added during the appeal process, the Final Appeal Panel did not accept that the First Appeal Panel had erred in its finding.

(6) Issue No. : FA-002-01
Appeal Rec'd : Jul 2013
Credit No. : EU10a BONUS Credit under BEAM Plus EB v1.1 (Provisional Assessment)
Description : This is an Existing Building under Provisional Assessment. The Applicant submitted (i) a letter issued by the Property Management Company which stated that they would employ a consultant to conduct a carbon audit; and (ii) a brief proposal listing the key steps of the carbon audit. The BONUS credit for carbon audit was not granted because the submissions could not demonstrate whether an "Action Plan" of GHG reduction would be developed and implemented.

- Decision : The Final Appeal Panel opined that for Provisional Assessment, the Applicant should provide supporting evidence (e.g. copy of consultancy agreement, approved budget, etc.) to prove their planned action on carbon audit. The letter issued by the Property Management Company was not sufficient proof of the said action. Furthermore, the submitted proposal indicated that the company would “discuss for emission reduction opportunities” rather than “develop an action plan of GHG reduction”. In view of the above, the Final Appeal Panel considered that the BONUS credit should not be granted.
- (7) Issue No. : FA-003-01
 Appeal Rec’d : Aug 2013
 Credit No. : EU1 and EU2 under BEAM Plus NB v1.1 (Provisional Assessment)
 Description : The project was a residential development. In EU1 and EU2, the Applicant did not indicate whether the energy consumption analysis had included hot water energy consumption. As such, no credit was granted under both EU1 and EU2.
- Decision : The Final Appeal Panel noted that the Applicant had been reminded to submit energy consumption analysis on the hot water system. Despite the reminder, the Applicant did not provide a specific answer on whether hot water system had been included. On this basis, no credit should be granted under EU1 and EU2. The Final Appeal Panel also noted that during the First Appeal, the Applicant revised the energy analysis report by adding hot water consumption. The Panel was of the opinion that new information should not be added during the appeal process. Such an addition did not comply with the Appeal rules and procedure.
- (8) Issue No. : FA-004-01
 Appeal Rec’d : Nov 2013
 Credit No. : IEQ3 under BEAM Plus NB v1.1 (Provisional Assessment)
 Description : The project was an educational building. In IEQ3, the Applicant claimed that the credit was not applicable because district cooling was adopted and there would not be any cooling tower. BEAM Society Limited (BSL) did not raise any question on the PA submission. In the end, the credit was judged by TRC to be applicable and zero credit was granted. The Applicant submitted a Final Appeal on the basis that no question was raised during PA submission and that part of the building was a car park with no air-side equipment, so IEQ3 should not be applicable to the car park area.
- Decision : The Final Appeal Panel noted that the Applicant had submitted a fully completed template under IEQ3. Under such circumstances, it was understandable that no question was raised by BSL. The Panel opined that BSL was not a consultant to the Applicant, and as such it had no responsibility to influence the Applicant’s decision on the applicability of the credit. The Panel also pointed out that IEQ3 was related to air-side equipment and water systems, in addition to cooling towers. Therefore, IEQ3 is also applicable to buildings adopting district cooling as well as the car park areas (which may have water supply). On this basis, the Panel concluded that IEQ3 should be applicable to the project.

- (9) Issue No. : FA-004-02
 Appeal Rec'd : Nov 2013
 Credit No. : IEQ8 under BEAM Plus NB v1.1 (Provisional Assessment)
 Description : The concerned building was a semi-enclosed car park with one side embedded into slope and the other side facing outdoor with R.C. parapets. In IEQ8, the Applicant claimed that the credit was not applicable because the car park adopted natural ventilation and did not rely on mechanical ventilation. In the end, the credit was judged by TRC to be applicable and zero credit was granted. The Applicant submitted a Final Appeal on the basis that the Background section of IEQ8 stated that "This applies to enclosed and semi-enclosed car parks that rely on mechanical ventilation or mechanically assisted natural ventilation." The Applicant also claimed that the natural ventilation design of the car park complied with an EPD document known as ProPEEC PN 193.
- Decision : The Final Appeal Panel examined the IEQ8 chapter of BEAM Plus Guidebook and found that in the Exclusions section, it was written "Buildings not provided with enclosed or semi-enclosed car parks". The Panel opined that the Applicant had to read both the Exclusions section and the Background section, but should not quote the Background section in isolation. Since the building was a semi-enclosed car park, according to the Exclusions statement, IEQ8 should be applicable. Secondly, the Panel found that the quoted document, ProPEEC PN 193 was not promulgated on the EPD website, and opined that the Applicant should follow the standard stipulated in the BEAM Plus Guidebook instead of quoting other unapproved document. The Panel concluded that IEQ8 should be applicable to the project.
- (10) Issue No. : FA-005-01
 Appeal Rec'd : Dec 2013
 Credit No. : EU11c under BEAM Plus NB v1.1 (Provisional Assessment)
 Description : The building was a sizeable office building. In pursuing EU11c, the Applicant highlighted that there was a "Management Staff Office" designated for chemical handling and storage as well as training. The credit was not granted as the Assessor opined that the office could not be used for chemical handling and storage. The Applicant submitted Appeals clarifying that the office was intended to be a first storage point for chemicals, which would eventually be delivered to Janitor Rooms; and highlighting that in the original architectural and E&M plan submissions, the locations of Janitor Rooms, as well as their drainage and ventilation facilities had already been shown.
- Decision : The Final Appeal Panel examined the submission template filled in by the Applicant. It was found that there was no specific explanation entered into the template to direct the Assessor to read the concerned Janitor Room architectural and E&M drawings. The Panel opined that the Applicant had a responsibility to make the supporting evidence clear under each and every submission template. Besides, the PA submission failed to indicate facilities other than the office, such as workshops and control room. On this basis, the Panel concluded that the credit under EU11c should not be granted.

- (11) Issue No. : FA-006-01
Appeal Rec'd : Jan 2014
Credit No. : EU1 under BEAM Plus NB v1.1 (Provisional Assessment)
Description : The building was a retail development with a covered car park within the building. In pursuing EU1, area weighting method was used. Energy simulation for the retail portion and the car park portion was performed separately. The Applicant opined that the simulation result of car park should be judged against the criterion set for "Other Building Types" but in the First Appeal, the TRC opined that the building type should be determined based on the host building that the car park served, i.e. the car park energy saving should also be judged against the criterion set for "Commercial and Hotel Buildings".
- Decision : The Final Appeal Panel noted that the operating modes of car park and commercial A/C area were basically different. Besides, the BEAM Plus manual/FAQ published at that time did not prohibit the Applicant from assessing the car park and the commercial area separately. In view of the above reasons, the Panel concluded that the Applicant should be allowed to judge the energy saving in car park against the criterion laid down for "Other Building Types".
- (12) Issue No. : FA-007-01
Appeal Rec'd : Jan 2014
Credit No. : SA12 under BEAM Plus NB v1.1 (Provisional Assessment)
Description : The building was a redevelopment project involving demolition and construction works. There was an existing residential building adjacent to the site. In pursuing SA12, the Applicant set up noise monitoring stations on the street level. The Assessor opined that the monitoring locations were not representative of the worst-affected location, and that if the worst-affected location was not accessible, based on the measured results, prediction should be made to estimate the construction noise at the worst-affected location.
- Decision : The Final Appeal Panel noted that the noise monitoring locations were on the street level while the worst case NSR should be at 1 m from the exterior wall of the adjacent residential units. Since the noise at street level was screened by the hoardings, calculation had to be performed to project the noise at the worst case NSR. Although the Appellant had submitted a simulation for this purpose, this was considered new information and should not be taken into account during the Final Appeal process. Based on the original lack of noise projection calculation, the Final Appeal Panel concluded that the credit should not be granted.
- (13) Issue No. : FA-007-02
Appeal Rec'd : Jan 2014
Credit No. : SA14 under BEAM Plus NB v1.1 (Provisional Assessment)
Description : The building was a residential development with split type air-conditioners. There was an existing residential building adjacent to the site. The Assessor rejected the claim for SA14 credit as the night time background noise level was not measured and there were errors in the calculation, namely the use of sound pressure level instead of sound power level for the air-conditioners, and the omission of façade correction factor and noise impact assessment for the adjacent residential building. In the First Appeal,

the Applicant gave an explanation for the night time background noise level and façade correction, but was unable to demonstrate that sound power level had been used, and also unable to prove that in the layout plan of the adjacent residential building, no habitable room was facing the site.

Decision : The Final Appeal Panel opined that sound power level and façade correction must be adopted at the same time, and that clear evidence should be provided to demonstrate whether there were habitable rooms facing the site. Although the Appellant had submitted new calculation that used sound power level and incorporated evidence of habitable spaces at the adjacent residential building, these were considered new information and should not be taken into account during the Final Appeal process. Also, when façade correction was added to the calculation, the noise limit was found to be exceeded. Therefore, the Final Appeal Panel concluded that the credit should not be granted.

(14) Issue No. : FA-008-01
Appeal Rec'd : Feb 2014
Credit No. : IEQ P1 under BEAM Plus NB v1.1 (Provisional Assessment)
Description : The building was a public building on a site subject to pollutions from the adjacent transport. TRC ruled that the credit IEQ P1 was not met because: (a) although air quality survey was done on site, the measurement time of O₃ and NO₂ was just 1 hour which was less than the IAQ Certification Scheme requirement of 8 hours; and (b) although the total ventilation rate was submitted, the ventilation rate calculation was missing.

Decision : For reason (a), the Final Appeal Panel opined that the IAQ Certification Scheme was designed for 'indoor' application. For this project, in the PA stage, without the building completed, the Applicant could only measure the fresh air in an untreated condition. The measurement location was also not the same as the future location of fresh air intake. As such, it would be inappropriate to assess such measurement strictly against the IAQ Certification Scheme. For reason (b), the Panel noted that at that time, the particular version of BEAM Plus Guidebook and Template did not explicitly state that the Applicant had to submit ventilation rate calculation. The Applicant did submit the result of calculation during PA stage but did not indicate the how the result was obtained. The Final Appeal Panel opined that as long as the total ventilation rate was not changed during the Appeal, the submitted calculation could be regarded as explanatory information. Summarising from the above, the Final Appeal Panel ruled that the credit of IEQ P1 was deemed to be provisionally achieved in the PA stage.

(15) Issue No. : FA-009-01
Appeal Rec'd : Apr 2014
Credit No. : SA P1 under BEAM Plus NB v1.1 (Provisional Assessment)
Description : The project was a residential development. In the PA stage, the Applicant submitted a G/F layout plan with the intended landscape areas hatched. Calculation was also shown to indicate the extent of landscape as a percentage of site area. The credit was deemed to be not achieved as the extent of hatched areas appeared to be excessive when compared with the planters shown on the GBP. The Applicant argued that the GBP should not be used to cross-check the landscape design as the details of GBP were not intended to be thorough.

- Decision : The Final Appeal Panel took the view that even if the GBP was not used for cross-checking, by looking at the original PA submission, the practice of hatching the G/F layout plan could not be accepted as a suitable practice for making the Master Landscape Plan. BEAM Plus Manual required “planting plans with the character and planting densities, details of the species used, assessment of environmental benefits”, etc. The submitted drawing could at best be regarded as an Area Calculation Diagram, but not a Master Landscape Plan. Besides, only areas with planting should be included. Mere “landscape decks” (i.e. hard landscape areas) should not be included. Thus, the credit was not granted.
- (16) Issue No. : FA-010-01
Appeal Rec’d : May 2014
Credit No. : EU10a under BEAM Plus NB v1.1 (Provisional Assessment)
Description : The project was a new building development. In the PA stage, the Applicant submitted a T&C specification which was a direct citation of the BEAM Plus Manual. The credit was not granted because the T&C requirements were not clear. In the First Appeal, the Applicant submitted extra pages of specification showing the specific T&C requirements. TRC opined that this was new information and could not be accepted.
- Decision : The Final Appeal Panel took the view that direct copying of BEAM Plus Manual clauses into the specification was not acceptable. The project team should derive specific T&C requirements for the project. Thus, the credit was not granted.
- (17) Issue No. : FA-010-02
Appeal Rec’d : May 2014
Credit No. : EU10b under BEAM Plus NB v1.1 (Provisional Assessment)
Description : The project was a new building development. In the PA stage, the Applicant indicated that an independent commissioning authority would be appointed in future. In the meantime, the contractors were responsible for T&C. They would prepare the commissioning plans and submit them to the independent authority for endorsement in future. The credit was not granted because the contractors could not be the commissioning authority. In the First Appeal, the Applicant supplemented that the consultant would act as the authority in the meantime. TRC opined that this was new information and could not be accepted.
- Decision : The Final Appeal Panel took the view that the commissioning authority in EU10b and independent authority in EU10e were two separate issues. The commissioning authority should still be the one who reviewed and approved the T&C specification. Also, the Panel noted that the commissioning plan was not submitted. Therefore, the credit was deemed not satisfied.
- (18) Issue No. : FA-010-03
Appeal Rec’d : May 2014
Credit No. : EU11c under BEAM Plus NB v1.1 (Provisional Assessment)
Description : The project was a residential development. In the PA submission, the Applicant highlighted that caretaker’s offices, management office, owners’

corporation (OC) office were provided on G/F and store rooms were provided on 2/F. The credit was not achieved as there were no workshop, control room and chemical storage/mixing area with drain and ventilation. In the First Appeal, the Applicant added detailed drawings showing the refuse rooms on G/F, which had drain and ventilation. TRC opined that these rooms could not be used for such purposes.

Decision : The Final Appeal Panel opined that the drawings showing the refuse room drawings were new information and could not be accepted. Besides, no workshop was provided in the development, even though the management office could be deemed to be used for housing computing facilities. Therefore, the credit requirement was deemed to be not met.

(19) Issue No. : FA-010-04
Appeal Rec'd : May 2014
Credit No. : EU12 under BEAM Plus NB v1.1 (Provisional Assessment)
Description : The project was a residential development. In the PA submission, the Applicant submitted a full set of electrical schematic diagrams including residential towers and podium but the meters were not highlighted. In response to comment, the Applicant re-submitted the drawings with highlighting, but these highlighted drawings only covered the residential towers without covering the podium. The credit was not achieved because (i) the podium drawing was missing, and (ii) VRV system was used, which was different from the specification that had specified chiller system. In the First Appeal, the Applicant explained that the design team finally decided not to use chillers and re-submitted the podium drawing with highlighting. TRC opined that the demonstration of metering for the podium was important, and that the use of power analysers to replace meters was not acceptable.

Decision : The Final Appeal Panel opined that power analysers with hour-run meter function and energy consumption display could be used for metering. The Panel noted that in the beginning, the Applicant did submit a full set of electrical schematics. Even though highlighting was missing in one of them, it would not be difficult to find the meters given that representative highlighting had been done in all the other drawings. As such, the Panel ruled that the credit requirement was deemed to have been achieved.

(20) Issue No. : FA-011-01
Appeal Rec'd : Sep 2014
Credit No. : SA15 under BEAM Plus NB v1.2 (Provisional Assessment)
Description : The project was an office development. In the PA submission, the Applicant submitted contract specification, design drawings, lighting catalogues, design narrative and presentation material prepared by the external lighting designer. However, lighting simulation was not submitted. The Assessor and TRC ruled that SA15 was not achieved. In both First and Final Appeals, the Appellant quoted BEAM Circular letter 2012.108 as evidence to support that contract specification was sufficient, and quoted past project cases performed by the same BEAM Pro where the credit was granted. In First Appeal, TRC did not accept the reasons and ruled that lighting simulation was still required.

- Decision : The Final Appeal Panel noted that the word “report” also appeared in BEAM Circular letter 2012.108. For SA15, this could mean the lighting calculation, simulation or measurement report. Also, the Panel considered that the assessment results of other projects were not relevant as every project should be ruled on its own based on published regulations (including BEAM Plus Manual, FAQs and Circulars) instead of being based on preceding cases. Since the Manual required demonstration that a number of light pollution parameters should be within limits, and this particular project failed to indicate these parameters (whose indication was reasonable in the design stage), the Panel considered that this credit was not achieved in the PA stage.
- (21) Issue No. : FA-012-01
 Appeal Rec’d : Nov 2014
 Credit No. : SA4 under BEAM Plus NB v1.1 (Provisional Assessment)
 Description : The project was a mid-rise building. In the PA submission, the Applicant submitted a highly localised map with heights of all buildings marked. The map showed that the subject building was higher than the immediately surrounding buildings. TRC opined that the submission failed to demonstrate that the design had taken full account of the neighbourhood. During First Appeal, the Applicant submitted extra diagrams that widened the scope of building height analysis to a larger district. When the scope was widened, it was demonstrated that the subject building was generally lower than the buildings further away. TRC opined that the submitted diagrams were new information, which could not be accepted during the appeal process.
- Decision : The Final Appeal Panel pointed out that according to Section 3.5 – Appeal Procedure in the BEAM Plus Procedures Manual, review of decision should primarily be based on the information originally submitted for assessment. Therefore, based on the information submitted in the PA assessment, it was judged that the Applicant had not fully met the credit requirements concerning site design appraisal, which according to HKPSG, should demand preservation of ridgelines/peaks, gradation of height profile, etc.
- (22) Issue No. : FA-012-02
 Appeal Rec’d : Nov 2014
 Credit No. : SA8a under BEAM Plus NB v1.1 (Provisional Assessment)
 Description : The project was a mid-rise building. In calculating the average wind speed (for proving there was no stagnant zone), the Applicant only divided the site into two groups of test points and calculated two representative average wind speeds. During First Appeal, TRC considered that the grouping of the test points was too rough as the Applicant treated all the pedestrian areas as one group. This was not acceptable as there were pavements running along different directions.
- Decision : The Final Appeal Panel further pointed out that when the Applicant calculated the wind amplification factor, he used the power-law wind profile and the type of terrain to estimate a single open-ground site wind speed. This was not acceptable as the baseline values should be simulated for every test point assuming the subject building was not built (not assuming the whole district was not built). Besides, the Panel noted that the number of wind directions simulated by the Applicant only covered 1/3

of the time annually, whereas according to BEAM Plus FAQ No. 14, the minimum requirement was 75%. In view of the above, the Panel considered that the credit was not achieved.

- (23) Issue No. : FA-012-03
Appeal Rec'd : Nov 2014
Credit No. : SA11 under BEAM Plus NB v1.1 (Provisional Assessment)
Description : The project was surrounded by schools, an abattoir and industrial buildings. In monitoring air pollution, the Applicant placed the dust monitoring station at the site entrance, which was close to the abattoir and the industrial buildings, but far away from the schools. During First Appeal, TRC ruled that the location of monitoring station was not acceptable as the Applicant should consider other monitoring locations that were close to the sensitive receivers (e.g. the schools).
- Decision : The Final Appeal Panel pointed out that according to the prevailing EPD requirements, the air monitoring stations should be located at representative ASRs. Although the Applicant submitted results of monitoring at three other locations during Final Appeal, these were considered new information and could not be accepted. Thus, the credit SA11 was deemed to be not achieved during PA submission stage.
- (24) Issue No. : FA-012-04
Appeal Rec'd : Nov 2014
Credit No. : MA4b under BEAM Plus NB v1.1 (Provisional Assessment)
Description : The project was a public building with various usages. In pursuing flexible engineering services, the Applicant claimed that hybrid HVAC system was used, and luminaires/sprinklers could be easily relocated. The assessors did not consider that the claims were justified as the amount of information submitted was inadequate. During First Appeal, TRC shared the same view.
- Decision : The Final Appeal Panel pointed out that the HVAC drawings submitted by the Applicant were of poor resolution. Furthermore, only HVAC layout drawings were submitted. Water-side and air-side schematic diagrams were not included. Thus, the claim of hybrid HVAC system was not adequately justified. Regarding the luminaire drawings, only false ceiling contractor's shop drawings were submitted. There was no contract specification or electrical installation detail to substantiate the luminaire mounting method and the electrical connection (e.g. flexible conduits). Therefore, the claim on flexible lighting was also not justified. On the sprinkler system, the Applicant only used ordinary sprinkler components. There was no particular feature to facilitate easy relocation of sprinklers. Therefore, the claim on flexible sprinklers was also not justified.
- (25) Issue No. : FA-012-05
Appeal Rec'd : Nov 2014
Credit No. : MA4c under BEAM Plus NB v1.1 (Provisional Assessment)
Description : The project was a curtain-walled building. In proving that the envelope was capable of accommodating changes to interior space (i.e. easy change of opaque/transparent/louvre functions), the Applicant emphasized that curtain wall system instead of concrete walls was used. The requirement was deemed not satisfied, and during First Appeal, TRC opined that the

Applicant should submit floor plans to demonstrate the envelope was able to accommodate layout changes.

Decision : The Final Appeal Panel noted that during PA stage, the Applicant had submitted detailed elevation drawings showing that the envelope adopted a curtain wall system in largely repetitive modules. The submitted details were reasonably sufficient to demonstrate the flexibility in changing the opaque/transparent/louvre functions. Thus, the Panel ruled that the requirement was deemed to have been achieved.

(26) Issue No. : FA-012-06
Appeal Rec'd : Nov 2014
Credit No. : IEQ8 under BEAM Plus NB v1.1 (Provisional Assessment)
Description : The project was a public building with a small portion (6.3%) of the area used as a car park. In the PA submission, the Applicant pursued IEQ8 (i.e. IAQ in car park) as usual. When the project was discussed in TRC, the question of whether Area Weighting Method (AWM) applied was raised. Thus, post-TRC Q&A was sought. In answering the Q&A, the Applicant confirmed that the AWM method needed not be applied as the area of the car park was too small. When finalising the assessment report, the assessor deleted the score obtained from IEQ8. The Applicant submitted a First Appeal as the IEQ8 Chapter in BEAM Plus Manual did not explicitly state that car park occupying less than 10% area would be excluded. TRC ruled that the score should be deleted as the car park area was smaller than 10%.

Decision : The Final Appeal Panel pointed out that there was an FAQ No. 1 on BSL website, which stated that under v1.1, a building use with area less than 10% of the total CFA would be exempted from the assessment. Based on the Applicant's reply to the post-TRC Q&A, the area of the main building use should be deemed to be 100% while that of the car park should be deemed to be 0%. Since the car park was deemed to be not present, the credit IEQ8 could not be applicable to this project.

(27) Issue No. : FA-013-01
Appeal Rec'd : Feb 2015
Credit No. : EU1 and EU2 under BEAM Plus NB v1.1 (Provisional Assessment)
Description : The project was a commercial building with variable speed chillers. In the energy simulation, the Applicant adopted a set of varying chiller COPs based on a set of varying condenser water temperatures at different loading conditions. In a post-TRC clarification exercise, the question requested the Applicant to use a constant condenser water temperature for all loading conditions. The Applicant replied that the Building Energy Code 2012 did not mandate such a constant water temperature and insisted that a varying temperature be used in the simulation.

Decision : The Final Appeal Panel ruled that the post-TRC question was overly restrictive, and that the Applicant should be given the freedom to choose whether to adopt constant water temperature or varying water temperature, and if the latter was chosen, it should be supported by Hong Kong's climatic data (wet bulb temperatures), the chiller plant's condenser water supply temperature reset controls and appropriate settings in the

simulation model (such as choosing “temperature dependence mode” for the chiller COP). The Final Appeal was thus ruled successful.

(28) Issue No. : FA-014-01
Appeal Rec’d : Jun 2015
Credit No. : SA3a under BEAM Plus NB v1.2 (Provisional Assessment)
Description : The project was a multi-block residential development. In the first submission, the starting point of walking distance under SA3a was chosen to be the main access point of the development. Upon comment, the point was changed to the worst-case building main entrance. However, during re-submission, the indicative locations of two neighbourhood amenities were combined into one owing to their close proximity. This created ambiguity and led to rejection by the Assessor. During First Appeal, the Appellant argued that the mapping software could not go into fine points that differentiated the entrances of the two amenities. TRC did not accept this argument. During Final Appeal, the Applicant pointed out that the original map had included a scale rule that facilitated the Assessor to estimate the minor difference in distances in relation to the entrances of the two amenities.

Decision : The Final Appeal Panel agreed that based on the submitted information, the concerned amenities couldn’t be more than 500 m away from the building main entrance. Thus, the Final Appeal was successful. However, the Panel opined that for the sake of avoiding argument, the locations of amenities should be precisely marked in the BEAM Plus submission based on the individual entrances. Further simplification or merging of points is not advisable.

(29) Issue No. : FA-014-02
Appeal Rec’d : Jun 2015
Credit No. : EU1 & 2 under BEAM Plus NB v1.2 (Provisional Assessment)
Description : The project was a residential development. In the energy estimation, the Applicant had not included exhaust fans in the kitchens and bathrooms, and in the car park areas, the baseline fan power was taken as 2.1 W per litre per second as the fans were of variable speed, and thus the Applicant took the 2.1 W figure from EMSD’s Building Energy Code (BEC) – section on VAV system. In other plant room exhaust fans, the Applicant adopted a baseline fan power of 1.6 W per litre per second based on BEC requirement on CAV system. The Applicant also argued that BSL’s FAQ Q4 for EU1 was released after the submission date of the project, so the fan energy for kitchens and bathrooms should not be mandatory for this project.

Decision : The Final Appeal Panel noted that the BEAM Plus Manual had clearly stated that “equipment, small power” should be included in the energy estimation. Therefore, ventilation fans in kitchens and bathrooms should be included. Besides, Section 6 in the BEC was intended for air-conditioning installations only. The fan power figures of 2.1 or 1.6 W per litre per second in the BEC could not be applied to exhaust fans or mechanical ventilation system. Where no applicable requirements exist in the BEC, the correct estimation method should be to assume the loads are identical in the proposed case and the baseline case. Thus, the Panel did not agree that the energy estimation for residential and car park portions was correct. The Final Appeal was thus unsuccessful.

- (30) Issue No. : FA-014-03
Appeal Rec'd : Jun 2015
Credit No. : EU3 under BEAM Plus NB v1.2 (Provisional Assessment)
Description : The project was a residential development. The Applicant pursued the first credit under EU3. LCA for foundation had been performed. However, that for superstructure was said to be performed at a later stage. The credit was rejected by the TRC. The Applicant argued that in a previous project, the same approach was accepted. They also cited the CPD training of 19 Dec 2014 and claimed that only after the CPD training, the LCA requirement was extended from foundation to the whole building.
- Decision : As a matter of principle, rulings in Final Appeal should primarily be based on published documents like BEAM Plus Manuals, Technical Circulars and FAQs. All these should take precedence over training materials and past project cases. The EU3 credit required that the major elements of the building structure, including building core, walls, etc. should be studied through LCA. Even without the CPD seminar mentioned by the Applicant, the BEAM Plus Manual was already very clear about this point. In this particular project, LCA for the superstructure had not been performed. Therefore, the credit in EU3 was not achieved.
- (31) Issue No. : FA-014-04
Appeal Rec'd : Jun 2015
Credit No. : WU3 under BEAM Plus NB v1.2 (Provisional Assessment)
Description : The project was a residential development. The Applicant pursued a 50% irrigation water reduction using two strategies at the same time, namely: plant species with low water consumption and rainwater harvesting. The Assessor rejected the claim as the Manual allowed the use of one strategy only, but not both. The Applicant argued that the Manual did mention "in comparison with conventional irrigation of *water intensive planting*".
- Decision : This credit had two possible routes of compliance. The first route was through soft landscaping design, species of plants, etc., to achieve zero use of municipal water after a period of establishment. The second route was to demonstrate the use of highly efficient irrigation technology, rainwater harvesting and/or grey water recycling so as to reduce fresh water consumption for irrigation by 50% or more. However, the Applicant chose to meet the 50% target stated in the second route, but adopted a mix of strategies from both route one and route two. This approach was not appropriate. Besides, the words "*water intensive planting*" in the Manual only referred to the baseline case. What the Manual emphasized in the design case was irrigation technology and water harvesting/recycling. It could not be assumed that in the design case, the planting could be changed from water intensive to non-water intensive.
- (32) Issue No. : FA-014-05
Appeal Rec'd : Jun 2015
Credit No. : IEQ23a under BEAM Plus NB v1.2 (Provisional Assessment)
Description : The project was a residential development. The Applicant included prestige entrances as an amenity feature. The TRC rejected the claim because under PNAP APP-42, this feature should be for non-domestic developments only.

Decision : Although the BEAM Plus Manual cited PNAP APP-42 in the footnote, the applicability of amenity features appeared not to be bound by the list inside PNAP APP-42 as the list was just “some examples of amenity features”. The Manual stated that the Client should submit a report prepared by a suitably qualified person detailing the amenity features provided. The rationale justifying the benefits should be clearly stated. The Final Appeal Panel did not rule out the possibility of having “prestige entrances” for residential buildings but for this particular project, the Panel found that some of the residential tower entrances had headroom of 3.6 metres only. This had a limited effect on improving daylight and ventilation. Owing to this reason, the Final Appeal was unsuccessful.

(33) Issue No. : FA-015-01
Appeal Rec'd : Oct 2015
Credit No. : EU1 under BEAM Plus NB v1.2 (Provisional Assessment)
Description : The project was a large building complex. The Applicant submitted an energy simulation report pursuing EU1. To illustrate how the lighting power densities (LPDs) were derived, calculation sheets showing LPD calculations were also submitted. There was more than one time of submission in response to comments/queries from BSL. In the last submission, the LPD calculation sheets were missing. The Assessor/TRC rejected the claimed lighting energy saving due to such omission.

Secondly, for this project, area weighting method was adopted in EU assessment. In the last section of the energy simulation report, two tables were included to show the summary of annual energy savings and the summary of EU scores achieved respectively. However, the area classifications in the two tables were not consistent. The amounts of savings were also not consistent. The Assessor wrote the Assessment Report based on the lesser of the two amounts of savings shown.

Decision : For the first issue, the Applicant admitted that there were calculation errors in the LPD calculations. Therefore, the calculations were not submitted in the last submission. Although the Applicant submitted the correct calculations during the Final Appeal, the Panel considered that the calculations were new information. As such, the information should not be taken into account. Owing to this reason, the Final Appeal for this issue was unsuccessful.

For the second issue, during Final Appeal, the Applicant explained that the types of air-conditioning equipment adopted by the different areas had been updated. Therefore, there should be a change to the area classifications. The Panel opined that if there was such a change, it would still be the Applicant's responsibility to keep the two tables consistent. Even though the errors were corrected during Final Appeal, the Assessor could only write the report based on what was presented during BEAM Plus submission. As such, any further correction during appeal should be disregarded. For this second issue, the Final Appeal was also unsuccessful.

(34) Issue No. : FA-015-02
Appeal Rec'd : Oct 2015
Credit No. : EU1 and EU2 under BEAM Plus NB v1.2 (Provisional Assessment)

- Description : The project was a building containing a public transport interchange (PTI). The Applicant submitted an energy simulation report pursuing EU1 and EU2. They intended to use demand control ventilation at the PTI. The Applicant submitted a calculation to show the emission loads in each hour, but the when the loads were used to predict the pollutant concentrations, it was unknown how the levels were derived, i.e. hourly fan operation profile was missing. Besides, the fan sizes appeared to be on the high side without justifications. The Assessor/TRC rejected the claimed ventilation energy saving due to these ambiguities.
- Decision : During Final Appeal, the Applicant submitted extra information demonstrating the fan sizing rationale and the hourly ventilation fan operation profile. The Panel considered that the calculations were new information. As such, the information should not be taken into account. Owing to this reason, the Final Appeal was unsuccessful.
- (35) Issue No. : FA-016-01
 Appeal Rec'd : Nov 2015
 Credit No. : EU10a under BEAM Plus NB v1.2 (Provisional Assessment)
 Description : The project was a residential project. The Applicant directly cited the BEAM Plus commissioning specification requirements in the Main Contract, and emphasized that the commissioning specifications would be prepared by the Contractor. During First Appeal, the TRC rejected the approach and opined that the commissioning specifications should be prepared by the MEP Consultant.
- Decision : The Final Appeal Panel opined that the elements listed in Section 8.5.1 of the BEAM Plus Manual should be provided in the E&M tender specifications. Therefore, the Final Appeal was unsuccessful.
- (36) Issue No. : FA-016-02
 Appeal Rec'd : Nov 2015
 Credit No. : IEQ2 under BEAM Plus NB v1.2 (Provisional Assessment)
 Description : The project was a residential project comprising a number of towers and houses. The Applicant submitted sample calculations of pipe and tank sizing for selected tower/house and quoted the haunch of U/G pipes as a measure to demonstrate attention had been paid to leaks at joints. The credit was not granted.
- Decision : During Final Appeal, the Applicant submitted a full set of pipe and tank sizing calculations. However, the Final Appeal Panel opined that the submission during assessment stage was incomplete and that the haunch was not a sufficient justification to demonstrate the designer had paid attention to leaks at joints. Therefore, the Final Appeal was unsuccessful.
- (37) Issue No. : FA-016-03
 Appeal Rec'd : Nov 2015
 Credit No. : IEQ21 under BEAM Plus NB v1.2 (Provisional Assessment)
 Description : The project was a residential project. The Applicant directly cited the BEAM Plus indoor vibration requirements in the Main Contract and emphasized

that vibration calculation was not yet available at the initial design stage. Drawings of installation details showing springs and rubber pads were submitted. The credit was not granted as calculation of vibration level and specification of vibration control measures were not submitted.

Decision : During Final Appeal, the Applicant submitted a vibration level calculation and added additional extracts from specifications showing the vibration control measures. However, the Final Appeal Panel opined that the submission during assessment stage was incomplete and that any additions during appeal should not be considered. Therefore, the Final Appeal was unsuccessful.

(38) Issue No. : FA-016-04
Appeal Rec'd : Nov 2015
Credit No. : IA1 under BEAM Plus NB v1.2 (Provisional Assessment)
Description : The project was a residential project in the N.T. comprising towers and houses. The Applicant proposed to provide a number of bicycle racks and claimed that such a provision would encourage occupants to use the cycling tracks in the adjacent neighbourhood. The TRC ruled that this provision was not justified as an IA1 achievement as the number of bicycle racks was less than that stipulated in the HKPSG.

Decision : During Final Appeal, the Applicant increased the number of racks to a level above the HKPSG requirement. However, the Final Appeal Panel opined that irrespective of the number of racks, the mere provision of bicycle racks was not an advanced practice or new technique that had not hitherto found application in HK. As such, the measure could not be regarded as innovative and therefore the Final Appeal was unsuccessful.

(39) Issue No. : FA-017-01
Appeal Rec'd : May 2016
Credit No. : IA1 under BEAM Plus NB v1.2 (Provisional Assessment)
Description : The project was a composite development. The Applicant proposed to install a food waste machine that would convert the food waste into liquid for discharge. The TRC ruled that the credit should not be granted due to insufficient information to justify the capacity of the machine, which was seen to be small.

Decision : The IA1 section of the BEAM Plus NB Manual states that credits may be awarded for *unconventional* designs that will *improve* the environmental performance of a building. The conversion of food waste into liquid instead of compost could be regarded as an unconventional design. Regarding the amount of improvement, the Manual at that time did not demand that the improvement must be significant. Since many innovative techniques would demand small-scale trial applications at the beginning, the Final Appeal Panel opined that it would be acceptable to allow a smaller machine to be used. As such, the Final Appeal was successful.

(40) Issue No. : FA-018-01
Appeal Rec'd : Nov 2016
Credit No. : EU1 under BEAM Plus NB v1.1 (Final Assessment)

- Description : The project was a residential development. The Applicant pursued EU1 through energy simulation. However, there were a lot of discrepancies between the main body of the energy simulation report and its appendices. Based on this, the assessor granted zero credit under EU1.
- Decision : The Final Appeal Panel noted that the Appellant had submitted a corrected version of the energy simulation report during the First Appeal. However, according to BEAM Plus Procedures Manual, review of decision on the credit under appeal would primarily be based on the information originally submitted for assessment. No new or additional information would be accepted during appeal. Based on the above, the Panel ruled that the Final Appeal was unsuccessful.
- (41) Issue No. : FA-019-01
 Appeal Rec'd : Jan 2019
 Credit No. : EU11c under BEAM Plus NB v1.2 (Provisional Assessment)
 Description : The project was a residential development. The Applicant pursued EU11c. The dispute was on the O&M room provision. FS Sprinkler Pump Room was first proposed as the O&M office. In response to BSL's comments, the Applicant changed the location of the office to a small recessed room in the staircase. This was submitted at the post-TRC stage. BSL rejected the proposal as substantiation was not adequate. A First Appeal was raised. The Applicant submitted new information to justify the room was suitable. The First Appeal Panel agreed to consider the new information in view of the fact that BSL did not raise queries on certain critical points during assessment. However, the First Appeal Panel still found inadequacies in the submitted information. As a result, the First Appeal was unsuccessful.
- Decision : The Final Appeal Panel did not agree that new information should be considered in the First Appeal. This was because during BEAM submission, it was the sole responsibility of the Applicant to furnish a complete submission for assessment. The absence of queries from BSL did not imply compliance with the requirements of the Manual.
- The Final Appeal Panel reviewed the original submission material, ignoring all new information added during appeals. It was found that design details on General Building Plans and E&M drawings did not fully support the Applicant's claim that the room was a properly furnished office. In view of the inadequacies, the Panel ruled that the Final Appeal was unsuccessful.

Remark: Each of the above project cases should be viewed in its particular context. Since assessment requirements may change as new FAQs or BEAM Technical Circulars are issued, rulings in past cases may not be applicable to present cases. Readers are advised to refer to the latest versions of the FAQs, Technical Circulars and other relevant documents. On credits related to innovative techniques (IA1), readers are reminded that as the technologies begin to be more widely adopted, they may no longer be regarded as eligible for claiming credit under IA1.

-End-